KEY *Points*

PROGRESS THROUGH PARTNERSHIP

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IT & ELECTRONICS

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Office of Science and Technology

THE SECTOR

IT & Electronics is one of the world's high growth industries. The UK is well positioned when comparing relative values for GDP (6%), IT production (5th) and consumption (4th) against the other 40 major economies. In 1992 the industry comprised some 7,464 businesses, employed 700,000 people, had a turnover of almost £30 billions, and spent £2.4 billions on research and development.
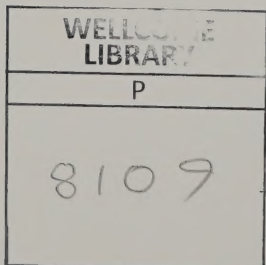
THE FUTURE

The Panel believe that the UK IT & Electronics industry is well placed to compete in the global market place and that it should go for aggressive growth, aiming to account for 10% of GDP by 2000, with a positive balance of trade. The Panel recognised that the top 10 revenue earning UK IT & Electronics companies are owned by inward investors and that the UK IT & Electronics industry would need to continue to attract and retain such investors and to enable its many small and medium enterprises to grow and compete in the global market. To achieve and sustain the aggressive growth target the industry would also need to encourage the development of new content-based information businesses, combining its skills with other sectors (such as health, education and leisure), to create new products and services relevant to global markets.
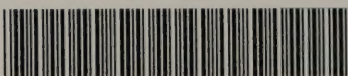
KEY RECOMMENDATIONS

The Panel has identified the following areas which it views as being crucial to underpinning the growth target, thereby improving UK wealth creation and quality of life, and deserving priority action.

- Compete in global markets, especially the USA.

- Promote key attractors for investment by both overseas and UK investors, such as a highly educated workforce, first class research and access to leading edge technologies in displays and silicon.

- Establish Centres of Collaboration for Semiconductors, Displays, Distributed Information Management and Electronic Media.

- Develop a coherent Information Superhighway policy, building on the strengths of all key players, to provide a leading position for the UK in the implementation of an Information Superhighway.

- Bring together the IT & Electronic sector stakeholders to develop a unified 'voice' to promote aggressive growth of the industry.

- Encourage the development of new multi-discipline, content-based electronic businesses including tele-medicine, tele-healthcare, remote learning, environmental monitoring and control, financial services, "edutainment", leisure products, etc.

FORWARD WITH FORESIGHT

The IT & Electronics Technology Foresight Sector Panel considers that the bodies identified below should take action in the following areas to implement its recommendations.

The Department of Trade and Industry

(i) Should lead an Information Superhighway Initiative that should undertake the following actions, calling on the expertise of UK industry, academia and government agencies:

- Take the initiative in accelerating the adoption of open standards for privacy, IPR protection, security and access.
- Promote public awareness of the Information Superhighway.
- Promote the development of UK based, multidisciplinary, electronic information businesses to offer information and services on the global Information Superhighway.
- Accelerate investment in deployment of the Information Superhighway in the UK.

(ii) Should encourage the leaders of the UK IT & Electronics sector to work together to provide a unified 'voice' and promote growth in the industry.

(iii) Should investigate schemes for large companies to 'uncle' and mentor the start-up and growth of new companies to create incubators for fast growth.

The Education and Employment Departments together with the Research Councils

(i) Should consider a UK Millennium Accelerator Programme targeted at the urgent development of courseware and a teacher training programme for IT-literacy in schools and industry.

(ii) Should consider the benefits of connecting schools, all higher education departments and adult education establishments to network facilities such as Superjanet or Internet, and of developing distance-learning modules and reference materials, in a variety of subjects, to improve the options available to UK students. These could also be offered remotely on a global basis.

The Research Councils together with the Department of Trade and Industry and UK Industry

(i) Should establish Centres for Collaboration in areas key to UK wealth creation. These centres should be distributed or virtual centres, uniting experts from appropriate disciplines from industry, university departments and government departments. They should also include overseas collaborators where this is appropriate. The Centres identified for IT & Electronics include Semiconductors, Displays, Distributed Information Management and Electronic Media.

(ii) Should promote the formation of interdisciplinary consortia to address the requirements for and development of multi-sector information businesses such as tele-medicine and tele-healthcare.

TECHNOLOGY FORESIGHT PROGRAMME

The purpose of the Technology Foresight Programme is to help business people, engineers and scientists become better informed about each other's efforts. It is bringing these communities together in networks - looking forward in partnership - which will help to identify emerging opportunities in markets and technologies. The Programme will also help to ensure that resources are used to best effect in support of wealth creation and improving the quality of life. The results of Foresight will inform decisions on spending by Government and industry. Foresight findings are available to small and medium sized enterprises which may not have the resources to undertake Foresight work on their own account.

The Technology Foresight Programme is co-ordinated by the Office of Science and Technology (part of the Cabinet Office). Foresight panels have been working in each of the following 15 sectors:

Agriculture, Natural Resources
 & Environment
Chemicals
Communications
Construction
Defence & Aerospace
Energy
Financial Services
Food & Drink

Health & Life Sciences
IT & Electronics
Leisure & Learning
Manufacturing, Production
 & Business Processes
Materials
Retail & Distribution
Transport

Summary leaflets (like this one) are available for each sector. Copies of these documents are available from the Office of Science and Technology, Albany House, 84-86 Petty France, London, SW1H 9ST (Fax: 0171-271-2015). Full reports for each sector are available from Her Majesty's Stationery Office.